ABSTRACT OF THE DISCLOSURE

Piezoelectric elements 10 and 10' are driven so as to satisfy the relationship

$$Nt=X0(1/(1/k2+1/k3)-1/(1/k1+1/k2+1/k3))$$

when the drive member, tip 20, and driven member, rotor 40, are in a state of intermittent contact, and in a state near the condition of transition from the intermittent contact state to the normal contact state. When the spring constant of the spring 41 is designated k1, the spring constant of the combined piezoelectric elements 10 and 10' and the tip 20 is designated k2, the spring constant of the rotor 40 is designated k3, the amount of displacement of the piezoelectric elements 10 and 10' is designated X0, and the compression force of the spring 41 is designated Nt.